



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/590,649	01/04/2007	Raiko Milanovic	0070996-000052	1499
21839	7590	04/21/2010	EXAMINER	
BUCHANAN, INGERSOLL & ROONEY PC POST OFFICE BOX 1404 ALEXANDRIA, VA 22313-1404				STEVENS, THOMAS H
ART UNIT		PAPER NUMBER		
2121				
NOTIFICATION DATE			DELIVERY MODE	
04/21/2010			ELECTRONIC	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ADIPFDD@bipc.com
offserv@bipc.com

Office Action Summary	Application No.	Applicant(s)
	10/590,649	MILANOVIC ET AL.
	Examiner	Art Unit
	THOMAS H. STEVENS	2121

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 21 January 2010.
- 2a) This action is **FINAL**. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-18 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ . |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ . | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| | 6) <input type="checkbox"/> Other: _____ . |

DETAILED ACTION

1. Claims 1-18 were examined.

Section I: Final Rejection

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

3. (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
4. Claims 1-18 are rejected under 35 U.S.C. 102(e) as being anticipated by Abrams et al., (US Patent 6,587,739; hereafter Abrams). Abrams discloses an intelligent appliance system.

Claim 1. A process control system (e.g., heater power control linked to a PLC and Mc, see figure 11) having comprising measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c) wherein a) all the measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c) contain means

for information processing (e.g., information transferred to appliances, column 8, lines 7-10)and for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65)between the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c), b) all the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are connected by means for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65), and c) a plurality, preferably all, of the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)have means for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65)with a service appliance (e.g., “coffee maker appliance”, column 1, line 61)which can be connected.

Claim 2. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11) as claimed in claim 1, wherein the means for information processing (e.g., information transferred to appliances, column 8, lines 7-10)and for data interchange (e.g., “information will still be available at the appliance and can be

retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65) between the measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c) are a microcomputer with interface devices for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65).

Claim 3. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11) as claimed in claim 1, wherein the means for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65) with a service appliance (e.g., “coffee maker appliance”, column 1, line 61) which can be connected are an interface device (PLC interface, column 1, lines 65-67) for bi-directional data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65) and a plug-in apparatus, with the interface device (PLC interface, column 1, lines 65-67) being designed to provide current data relating to the process state for calling up.

Claim 4. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11) as claimed in claim 1, wherein point-to-point links are produced as

Art Unit: 2121

means for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange.

Claim 5. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 1, wherein a bus system, to which all of the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are connected, is provided as the means for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65).

Claim 6. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 1, wherein a laptop or a PDA(element 290) is used as the service appliance (e.g., “coffee maker appliance”, column 1, line 61)which can be connected.

Claim 7. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 1, wherein the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are designed to carry out plausibility checks and diagnoses (customer runs diagnostic test remotely, column 11, lines 11-15).

Art Unit: 2121

Claim 8. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 1, wherein the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are designed for preprocessing of recorded data (e.g., database, column 6, line 58).

Claim 9. A method for operation of a process control system as claimed in claim 1, wherein data which has been recorded in measurement devices (e.g., sensors, element 230, figure 2)of the system by sensors (e.g., sensors, element 230, figure 2)of the measurement devices (e.g., sensors, element 230, figure 2)and has possibly been obtained by preprocessing is linked to data from other measurement devices, and all of the data is stored and is transmitted to respective other measurement devices (e.g., sensors, element 230, figure 2)and to actuators (e.g., temperature sensor and the microcontroller, figure 18c)), and data which has been called up from a service device which is connected to measurement devices (e.g., sensors, element 230, figure 2)or actuators (e.g., temperature sensor and the microcontroller, figure 18c)is emitted.

Claim 10. The method as claimed in claim 9, wherein self- diagnoses (customer runs diagnostic test remotely, column 11, lines 11-15) are carried out in the components of the process control system, whose results are likewise stored such that they can be called up by a service device (e.g., coffee maker, column 1, line 61).

Claim 11. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 2, wherein the means for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65)with a service appliance (e.g., “coffee maker appliance”, column 1, line 61)which can be connected are an interface device (PLC interface, column 1, lines 65-67)for bi-directional data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65)and a plug-in apparatus, with the interface device (PLC interface, column 1, lines 65-67)being designed to provide current data relating to aprocess state for calling up.

Claim 12. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 11, wherein point-to-point links are produced as means for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65).

Claim 13. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 12, wherein a bus system, to which all of the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g.,

temperature sensor and the microcontroller, figure 18c)are connected, is provided as the means for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65).

Claim 14. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 13, wherein a laptop or a PDA (element 290)is used as the service appliance (e.g., “coffee maker appliance”, column 1, line 61)which can be connected.

Claim 15. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 14, wherein the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are designed to carry out plausibility checks and diagnoses (customer runs diagnostic test remotely, column 11, lines 11-15).

Claim 16. The process control system (e.g., heater power control linked to a PLC and Mc, see figure 11)as claimed in claim 15, wherein the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)are designed for preprocessing of recorded data (e.g., database, column 6, line 58).

Claim 17. A method for operation of a process control system(e.g., heater power control linked to a PLC and Mc, see figure 11) as claimed in claim 16, wherein: data which has

been recorded in measurement devices (e.g., sensors, element 230, figure 2) of the system by sensors of the measurement devices (e.g., sensors, element 230, figure 2) and has possibly been obtained by preprocessing is linked to data from other measurement devices, (e.g., sensors, element 230, figure 2) and all of the data is stored and is transmitted to the respective other measurement devices (e.g., sensors, element 230, figure 2) and to actuators (e.g., temperature sensor and the microcontroller, figure 18c)), and data which has been called up from a service device which is connected to measurement devices (e.g., sensors, element 230, figure 2) or actuators (e.g., temperature sensor and the microcontroller, figure 18c) is emitted.

Claim 18. A process control system, (e.g., heater power control linked to a PLC and Mc, see figure 11) comprising: measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c)), each of which includes means for information processing (e.g., information transferred to appliances, column 8, lines 7-10) and for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65) between the measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c)); means for interconnecting the measurement devices (e.g., sensors, element 230, figure 2) and actuators (e.g., temperature sensor and the microcontroller, figure 18c) for bidirectional (e.g., bidirectional power line communication, column 1, lines 62-67; also messages

between the device and the controller, column 7, lines 1-4) data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65); and means, provided with multiple ones of the measurement devices (e.g., sensors, element 230, figure 2)and actuators (e.g., temperature sensor and the microcontroller, figure 18c)), for data interchange (e.g., “information will still be available at the appliance and can be retrieved as needed”, column 6, line 64-65) (e.g., information will still be available at the appliance and can be retrieved as needed”, column 6, lines 58-65)with a service appliance (e.g., “coffee maker appliance”, column 1, line 61)which can be connected.

Section III: Response to Arguments

102(e)

5. The applicants are thanked for addressing these issues; however their response is non-persuasive in view of the prior art. In figure 18c, there appears to be directional connection between the microcontroller 205 and the temperature sensor (also see column 21, lines 35-41). The fact that the lid sensor doesn't communication with the temperature sensor is immaterial since this feature is not claimed. Claim 1 states “a plurality, preferably all, of the measurement devices,” meaning one has the option of all or a plurality, thus the art does anticipate at least one option i.e., the plurality. Furthermore, the bidirectional means well known such that one of ordinary skill in the art

would deduce its definition as simply two-way communications. Same holds true for information processing that could be interpreted as a CPU. Rejection is maintained.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mr. Tom Stevens whose telephone number is 571-272-3715.

If attempts to reach the examiner by telephone are unsuccessful, please contact examiner's supervisor Mr. Albert Decayd (571-272-3819). The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov..> Answers to questions regarding access to the Private PAIR system, contact the Electronic Business Center (EBC) (toll-free (866-217-9197)).

/Thomas H. Stevens/

Examiner, Art Unit 2121

/Albert DeCady/

Supervisory Patent Examiner, Art Unit 2121